UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 5
77 WEST JACKSON BOULEVARD
CHICAGO, IL 60604-3590

OCT 19 2009

REPLY TO THE ATTENTION OF:

E-19J

Christine Cardus
U.S. Army Corps of Engineers
1776 Niagara Street
Buffalo, New York 14207-3199

Re: Draft Cleveland Harbor Dredged Material Management Plan (DMMP) and Environmental Impact Statement (EIS), Cuyahoga County, Ohio - EIS No. 20090312

Dear Ms. Cardus:

The U.S. Environmental Protection Agency has reviewed the above-mentioned document, which evaluates the U.S. Army Corps of Engineers' (USACE) plan for maintenance dredging and disposal of dredged materials from the Cleveland Harbor, Ohio Federal Navigation Project. Our review was conducted pursuant to the National Environmental Policy Act (NEPA), the Council on Environmental Quality's NEPA Implementing Regulations (40 CFR 1500-1508), and Section 309 of the Clean Air Act.

Seven alternatives were carried forward for detailed analysis to fulfill the need for the continued operation and economic viability of Cleveland Harbor as a commercial navigation port on the Great Lakes. The Draft DMMP and EIS indicate that the tentatively-selected plan is Alternative Plan 4a, which is also the locally-preferred plan. Alternative Plan 4a consists of: 1) management of existing confined disposal facilities (CDF) to provide needed capacity in the short-term, and 2) construction of a new CDF at the foot of East 55th Street with certain improvements to the CDF walls. Proposed wall improvements make the site more suitable for potential future development once the CDF is filled and transferred to the local sponsor, the Cleveland-Cuyahoga County Port Authority.

Based on our review of the Draft DMMP and EIS, we have assigned a rating of "Environmental Concerns – Insufficient Information." While we have not identified environmental impacts that should be avoided, we recommend the USACE address the following issues in the Final EIS: 1) mitigation for air quality impacts; 2) the need for a qualitative discussion of potential impacts resulting from supplying quarry stone to the construction site;

and 3) the need for a qualitative discussion focused on potential impacts from climate change on dredge operations and operation of the CDF. A copy of our rating definitions is enclosed with this letter.

Air Quality

In order to protect air quality during construction and operation of the CDF, we recommend implementation of one or more of the following measures where feasible:

- Reduce emissions of diesel particulate matter (DPM) and other air pollutants by using particle traps and other technological or operational methods. Control technologies, such as traps, control approximately 80 percent of DPM. Specialized catalytic converters (oxidation catalysts) control approximately 20 percent of DPM, 40 percent of carbon monoxide emissions, and 50 percent of hydrocarbon emissions.
- Ensure that diesel-powered construction equipment is properly tuned and maintained, and shut off when not in direct use.
- Prohibit engine tampering to increase horsepower.
- Locate diesel engines, motors, and equipment as far as possible from residential areas and sensitive receptors (e.g., schools, daycare centers, and hospitals).
- Require low sulfur diesel fuel (<15 parts per million), if available.
- Reduce construction-related trips of workers and equipment, including trucks.
- Lease or buy newer, cleaner equipment at the Tier 2 level or higher, using a minimum of 75 percent of the equipment's total horsepower.
- Use engine types such as electric, liquefied gas, hydrogen fuel cells, and/or alternative diesel formulations, if feasible.
- Use construction equipment retrofitted with diesel oxidation catalysts or diesel particulate filters from the Verified List from EPA or the California Air Resources Board. Additionally, emissions will be further reduced by installing retrofit emission control devices on all non-road equipment with higher emissions than EPA's Tier 2 Standards. The following table indicates the model year for which these standards take effect. Equipment that is of a model year older than the year given for that equipment's respective horsepower range should be retrofitted.

Horsepower Range	Model Year (or newer)
50-99	2004
100-299	2003
300-599	2001
600-749	2002
750 and up	2006

We recommend the Final EIS discuss plans for reducing emissions. We also recommend commitments to include emissions reduction measures appropriate to CDF construction and dredging operations be included in the Record of Decision.

Environmental Effects Evaluation

The Draft EIS indicates there is currently no single quarry on Lake Erie able to produce the size and quantity of stone required to construct the proposed CDF and that multiple

quarries would be used to obtain sufficient stone. We recommend the Final EIS include a qualitative discussion focused on the impact from delivery of major construction materials. For example, how might stone be transported to the construction site and what impact would delivery have on the immediate area? Such a discussion would provide reviewers with an understanding of the full range of impacts associated with this project.

Climate Change

We recommend the Final EIS address the potential for climate change to impact dredge operations. Specifically, we suggest the discussion focus on how a change in precipitation and lake levels could affect dredging operations and, consequently, CDF capacity over the projected 20-year life of the project. For example, if precipitation and lake levels exhibit a downward trend, more material would need to be removed from the Harbor, affecting projected CDF capacity. We believe the analysis would benefit from a qualitative discussion focused on recent water level trends, whether the amount of material which needs to be dredged to maintain authorized depths is changing, and, if this is the case, whether this factor has been accounted for in the design of the CDF.

Mitigation

Pursuant to a discussion between Kathy Kowal, of my staff, and yourself, we understand that incorporating additional toe stone to support fish spawning shelves will be considered in the design phase. We also understand that locations for man-made fish habitats will be discussed with ODNR staff to determine optimal placement sites.

In summary, we request the USACE address the possibility of reducing air quality impacts by employing emission reduction measures where feasible, impacts of supplying quarry stone to the construction site, and potential impacts to the project from climate change.

We appreciate the opportunity to provide comments on this project. Please send us future NEPA documents on this project as they become available. If you have any questions concerning the contents of this letter, please do not hesitate to contact me or Kathleen Kowal of my staff at (312) 353-5206 or via email at kowal.kathleen@epa.gov.

Sincerely,

Kenneth A. Westlake
Chief, NEPA Implementation Section
Office of Enforcement & Compliance Assurance

Enclosure: Ratings Summary